

LESSON 5.2 Experimental Probability of Simple Events

TEKS
Proportionality—
7.6.I Determine experimental and theoretical probabilities related to simple and compound events using data and sample spaces. *Also 7.6.A, 7.6.B, 7.6.C*



ESSENTIAL QUESTION

How do you find the experimental probability of a simple event?

EXPLORE ACTIVITY

TEKS 7.6.I

Finding Experimental Probability

You can toss a paper cup to demonstrate *experimental probability*.

- A** Consider tossing a paper cup. Fill in the Outcome column of the table with the three different ways the cup could land.
- B** Toss a paper cup twenty times. Record your observations in the table.

Outcome	Number of Times

Reflect

- Which outcome do you think is most likely?

- Describe the three outcomes using the words *likely* and *unlikely*.

- Use the number of times each event occurred to calculate the probability of each event.
- What do you think would happen if you performed more trials?

Outcome	Experimental Probability
Open-end up	$\frac{\text{open-end up}}{20} = \frac{\square}{20}$
Open-end down	$\frac{\text{open-end down}}{20} = \frac{\square}{20}$
On its side	$\frac{\text{on its side}}{20} = \frac{\square}{20}$

- What is the sum of the three probabilities in the table?
